Amendment under Art. 34 of PCT 10/500125" 15 DT04 Rec'd PCT/PTO 2 5 JUN 2004

CLAIMS

- 1. (Amended) A boat for a thermal process comprising:
 - a plurality of pillars,
- a plurality of claws formed in each of the pillars in a height direction at predetermined intervals,
- a plurality of supporting plates mounted in a tier-like manner between the plurality of pillars via the claws, each supporting plate having an object-to-be-processed mounting surface on which an object to be processed can be mounted, and
- groove and a through hole provided in the object-to-be-processed mounting surface, wherein

the plurality of pillars are arranged at least on the left hand and on the right hand of the supporting plated, and

the supporting plate has

- a left engaging part that can be engaged with a claw of the pillar on the left hand of the supporting plates in order to prevent dropping of the supporting plate, and a right engaging part that can be engaged with
- a claw of the pillar on the right hand of the supporting plates in order to prevent the dropping of the supporting plate.
- 2. (Amended) A boat for a thermal process according to claim 1, wherein
- minute irregularity is provided object-to-be-processed mounting surface in order to inhibit sticking of the object to be processed.
- 3. A boat for a thermal process according to claim 1 or 2, wherein

the supporting plates are substantially circular, and the plurality of pillars are arranged behind, on the left hand of; and on the right hand of the supporting plates,

Amendment under Art. 34 of PCT

16

NAL SI VIDE perpendicularly to the supporting plates.

> 4. (Amended) A boat for a thermal process according to any of claims 1 to 3, wherein

> > the supporting plate is substantially circular,

a plurality of circular grooves are concentrically provided, and

a plurality of through holes are arranged in each groove at predetermined intervals circumferential direction of the circular groove.

5. (Amended) A boat for a thermal process according to any of claims 1 to 4, wherein

each of the left engaging part and the right engaging part is a stopper member that is abutted against a lateral wall part of the claw.

6. Aboat for a thermal process according to claim 3, wherein the supporting plate has

a left engaging hole that can be engaged with an upper portion of a claw of the pillar on the left hand of the supporting plates,

a right engaging hole that can be engaged with an upper portion of a claw of the pillar on the right hand of the supporting plates, and

a back engaging hole that can be engaged with an upper portion of a claw of the pillar behind the supporting plates.

A boat for a thermal process according to any of claims 7. 1 to 6, wherein

dummy plates are mounted at an upper end portion and a lower end portion of the pillars.

8. A boat for a thermal process according to any of claims 1 to 6, wherein

a plurality of dummy plates are mounted in a tier-like

Amendment under Art. 34 of PCT

manner between the plurality of pillars via the claws, at an upper end portion and a lower end portion of the pillars, respectively.

- 9. Aboat for a thermal process according to claim 8, wherein the dummy plates are substantially circular, and the plurality of pillars are arranged behind, on the left hand of, and on the right hand of the dummy plates, perpendicularly to the dummy plates.
- 10. Aboat for a thermal process according to claim 9, wherein the dummy plate has

a dummy-plate left engaging part that can be engaged with a claw of the pillar on the left hand of the dummy plates in order to prevent dropping of the dummy plate, and

a dummy-plate right engaging part that can be engaged with a claw of the pillar on the right hand of the dummy plates in order to prevent the dropping of the dummy plate.

11. A boat for a thermal process according to claim 10, wherein

each of the dummy-plate left engaging part and the dummy-plate right engaging part is a stopper member that is abutted against a lateral wall part of the claw.

- 12. Aboat for a thermal process according to claim 9, wherein the dummy plate has
- a dummy-plate left engaging hole that can be engaged with an upper portion of a claw of the pillar on the left hand of the dummy plates,
- a dummy-plate right engaging hole that can be engaged with an upper portion of a claw of the pillar on the right hand of the dummy plates, and
- a dummy-plate back engaging hole that can be engaged with an upper portion of a claw of the pillar behind the dummy plates.

ART 30 ANDT

Amendment under Art. 34 of PCT 18

13. A vertical thermal processing unit, wherein a boat for a thermal process according to any of claims1 to 12, and

a thermal processing furnace that can contain the boat for a thermal process.